

**AMENDMENT TO THE CLAIMS:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**LISTING OF CLAIMS:**

1.-12. (Cancelled)

13. (Currently Amended) A pharmaceutical composition which comprises, as an active principle, methoxymorpholino doxorubicin (MMDX) and a pharmaceutically acceptable agent which remains selectively in a liver tumor after its injection through into the hepatic artery, wherein the MMDX is co-administered with the agent.

14. (Currently Amended) [[A]] The pharmaceutical composition according to claim 13, wherein the agent is iodized oil.

15.-17. (Cancelled)

18. (Currently Amended) A method of treating a human liver tumor which comprises the intrahepatic administration of a therapeutically effective amount of methoxymorpholino doxorubicin (MMDX) to a patient in need thereof, wherein said MMDX is administered as an infusion of from about 15 minutes to about 30 minutes every 4 weeks.

19. (Currently Amended) A method for reducing methoxymorpholino doxorubicin systemic exposure of a patient suffering from a liver cancer which comprises the intrahepatic administration of a therapeutically effective amount of methoxymorpholino doxorubicin (MMDX) to said patient, wherein said MMDX is administered as an infusion of from about 15 minutes to about 30 minutes every 4 weeks.

20. (Currently Amended) [[A]] The method according to claim 18, wherein the liver tumor is a tumor primarily confined to the liver.

21. (Currently Amended) [[A]] The method according to claim 20, wherein the tumor primarily confined to the liver is a hepatocellular carcinoma (HCC) or a cholangiocarcinoma.

22. (Currently Amended) [[A]] The method according to claim 18, wherein the tumor is a liver metastasis.

23. (Currently Amended) [[A]] The method according to claim 18, wherein the intrahepatic administration of MMDX is via the hepatic artery.

24. (Currently Amended) [[A]] The method according to claim 18, wherein MMDX is administered as an infusion of from about 15 minutes to about 30 minutes every 4 weeks.

25. (Currently Amended) [[A]] The method according to claim 26, wherein MMDX is administered as a 5-10 minute bolus every 8 weeks.

26. (Currently Amended) [[A]] The method according to claim 18, wherein MMDX is administered with an agent, which remains selectively in a liver tumor after its injection ~~through~~ into the hepatic artery.

27. (Currently Amended) [[A]] The method according to claim 26, wherein the agent is iodized oil.

28. (Currently Amended) [[A]] The method according to claim 18, wherein MMDX is administered in a dose ranging from about 100 mcg/m<sup>2</sup> to about 1000 mcg/m<sup>2</sup>.

29. (Currently Amended) [[A]] The method according to claim 28, wherein MMDX is administered in a dose ranging from about 100 mcg/m<sup>2</sup> to about 800 mcg/m<sup>2</sup>.

30. (Currently Amended) [[A]] The method according to claim 29, wherein the dose is 200 mcg/m<sup>2</sup>.

31. (Currently Amended) A method of treating human liver tumor, which comprises the intrahepatic administration of a therapeutically effective amount of a pharmaceutical composition which comprises as an active principle methoxymorpholino doxorubicin (MMDX) and a pharmaceutically acceptable agent which remains selectively in a liver tumor after its injection through into the hepatic artery, wherein said MMDX is administered as a 5 to 10 minutes bolus every 8 weeks.

32. (Currently Amended) A method of treating a human liver tumor which comprises the intrahepatic administration of a therapeutically effective amount of methoxymorpholino doxorubicin (MMDX) to a patient in need thereof, wherein said MMDX is administered as a 5 to 10 minutes bolus every 8 weeks.

33. (Currently Amended) A method for reducing methoxymorpholino doxorubicin systemic exposure of a patient suffering from a liver cancer which comprises the intrahepatic administration of a therapeutically effective amount of methoxymorpholino doxorubicin (MMDX) to said patient, wherein said MMDX is administered as a 5 to 10 minutes bolus every 8 weeks.